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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/041,643	01/08/2002	Ernest K. Kenneway	DUN02 P-304	6910
277	7590	03/22/2004	EXAMINER	
PRICE HENEVELD COOPER DEWITT & LITTON, LLP 695 KENMOOR, S.E. P O BOX 2567 GRAND RAPIDS, MI 49501			KOHNER, MATTHEW J	
			ART UNIT	PAPER NUMBER
			3653	

DATE MAILED: 03/22/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/041,643

Applicant(s)

KENNEWAY, ERNEST K

Examiner

Matthew J Kohner

Art Unit

3653

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 06 January 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-29 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 18-22, 24, 25 and 28 is/are allowed.
- 6) ☒ Claim(s) 1, 2, 4, 6, 7, 9-14, 16, 23, 26, 27 and 29 is/are rejected.
- 7) ☒ Claim(s) 3, 5, 8, 15 and 17 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Response to Amendments / Arguments***

The applicant's amendment to claim 20 has overcome the objection noted in the previous office action.

The applicant's amendments to claims 4, 5, 16, 17, 21 and 22 have overcome the 112 rejection noted in the previous office action.

The applicant has argued that the claims 6 and 9 are definite and do particularly point out and distinctly claim the subject matter which applicant regards as his invention. Applicant argues that because an item might be rejected during its transportation in the cup conveyor, the system therefore includes a first and second plurality of objects. Examiner disagrees. As applicant concedes in his argument, "the second plurality of objects may be the same as the first plurality of objects ..." If the second plurality is the same as the first plurality, then they are the same plurality and it is, at the very least, misleading to refer to them as first and second pluralities. The term "a second plurality" of objects could be interpreted to include a second and distinct set of objects which are delivered to the conveyor from a second and distinct hopper. A single group (i.e. plurality) of objects is sent through the system. The mere possibility that the some objects might be rejected along the conveyor does not make it a different group of objects. Therefore, the 112 rejection is maintained with regard to claims 6 and 9.

Examiner accepts applicant's arguments with regard to claims 1, 3, 4, 13, 15, 16, 18, 20 and 21. Therefore, 103 rejection of these claims, made in the previous office action, is withdrawn.

***Claim Rejections - 35 USC § 112***

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 6, 9 12, 10, 23, 26, 27 and 29 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

These claims contain the limitation of a “second” plurality of objects. However, the plurality of objects appears to be the same plurality of capsules etc. as the “first” plurality of objects.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 13 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent No. 5,405,015 to Bhatia.

Bhatia discloses a method for automatically inspecting a plurality of objects and sorting acceptable objects from defective objects which includes:

- receiving a plurality of objects (See Fig. 1);
- rotating and moving the objects through an inspection area (Col. 10, lines 33+);

- capturing an image of each of the plurality of objects as the plurality of objects move through the inspection area (Col. 10, lines 33+);

- comparing the captured image of each of the plurality of objects to at least one stored image to determine whether an object is defective (Col. 11, lines 1+); and

- directing a defective object such that the defective object is separated from the inspected acceptable objects (Col. 11, lines 50+).

Claim 13 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent No. 5,626,236 to Hiebert.

Hiebert discloses a method for automatically inspecting a plurality of objects and sorting acceptable objects from defective objects which includes:

- receiving a plurality of objects (See Fig. 1);
- rotating and moving the objects through an inspection area (Col. 10, lines 20+);
- capturing an image of each of the plurality of objects as the plurality of objects move through the inspection area (Col. 9, lines 45+);

- comparing the captured image of each of the plurality of objects to at least one stored image to determine whether an object is defective (Col. 9, lines 55+); and

- directing a defective object such that the defective object is separated from the inspected acceptable objects (Col. 9, lines 62+).

Claim 13 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent No. 4,707,251 to Jenkins.

Jenkins discloses a method for automatically inspecting a plurality of objects and sorting acceptable objects from defective objects which includes:

- receiving a plurality of objects (See Fig. 1);
- rotating and moving the objects through an inspection area (Col. 4, lines 8+);
- capturing an image of each of the plurality of objects as the plurality of objects move through the inspection area (Col. 4, lines 21+);
- comparing the captured image of each of the plurality of objects to at least one stored image to determine whether an object is defective (Col. 4, lines 50+); and
- directing a defective object such that the defective object is separated from the inspected acceptable objects (Col. 4, lines 50+).

***Claim Rejections - 35 USC § 103***

Claims 1, 2, 4, 7, 11, 14 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jenkins.

Jenkins discloses an object sorting system for automatically inspecting a plurality of objects and sorting acceptable objects from defective objects which includes:

- a feed conveyor (25)
- a barrier (30) placed across a top surface of the feed conveyor wherein the barrier defines a boundary of the inspection area and causes the first plurality of objects to rotate about an object axis
- a sorting camera (24);
- at least one final rejection valve (32);

- a processor (col. 3, lines 32+) for executing an inspection routine that controls: a speed of the conveyor, a scanning rate of the sorting camera, and actuation of the at least one final rejection valve (Col. 4, lines 50+).

Jenkins does not specifically disclose the computer controls the speed of the conveyor or the scanning rate of the camera. However, Jenkins does disclose that the computer controls the rate at which the containers are released for scanning (Col. 3, lines 32+), which serves the same purpose as controlling the speed of the conveyor.

Further, Jenkins discloses that in order for the entire surface of the wall of the container to be visible to the scanners, the container must complete at least one complete rotation while within the view of the scanner and be presented to the scanner for a minimum period of time (Col. 4, lines 28+). Jenkins goes on to say that this is achieved by the proper selection of scanners, conveyor speed and angle of the diagonal bar (Col. 4, lines 32+). Therefore, in light of Jenkins' disclosure, it would be obvious to one of ordinary skill in the art to control the rate of scanning and speed of the conveyor by way of a computer/processor.

In regard to claims 2 and 14, see Col. 4, lines 32+.

In regard to claims 4 and 16, see Fig. 1.

In regard to claims 7, Jenkins discloses the diagonal barrier can be a wire (Col. 3, lines 64+).

In regard to claim 11, applicant's camera and Jenkins' scanner perform equivalent functions. Additionally, applicant has not provided any criticality regarding the type of camera used in the system. Therefore, the type of camera used would appear to be an obvious matter of design choice.

***Allowable Subject Matter***

Claims 3, 5, 8, 15, 17 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Claims 18-22, 24, 25 and 28 are allowed.

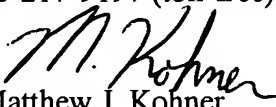
***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Matthew J. Kohner whose telephone number is 703-305-8496. The examiner can normally be reached on Mon-Fri 9-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Donald Walsh can be reached on 703-306-4173. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
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